

PATENT ABSTRACTS OF JAPAN

(11)Publication number : 2002-023483

(43)Date of publication of application : 23.01.2002

(51)Int.Cl.

G03G 15/08
F16C 13/00

(21)Application number : 2000-204996

(71)Applicant : CANON INC

(22)Date of filing : 06.07.2000

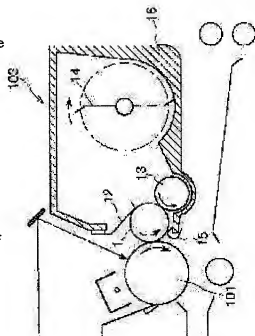
(72)Inventor : NONOMURA MAKOTO
SAKAIZAWA KATSUHIRO
OZEKI YUKIHIRO
SEKIGUCHI MANAMI

(54) IMAGE FORMING DEVICE

(57)Abstract:

PROBLEM TO BE SOLVED: To provide an image forming device whose image forming speed is made high, which can maintain an excellent image over a long term and which can achieve the same effect even in the case of adopting simple device constitution of cleaning simultaneously with developing.

SOLUTION: A latent image on a photoreceptor drum 101 having circumferential speed $V1$ is contact-developed by a reversal developing system by a developing device 103 whose developing roller has circumferential speed $V2$ by driving at $75 \text{ mm/s} \leq V1 < V2$. The toner carrying surface of the developing roller 1 is formed of a low frictional material satisfying $0.01 < \mu < (15/100000) \times (R-100)^2 + 0.16$ assuming that the roundness of toner defined by a shape factor SF-2 is R for the coefficient of dynamic friction μ to SUS in the toner carrying direction of the toner carrying surface in order to restrain the application of excessive momentum from the toner carrying surface and make toner carrying force uniform and constant.



面材に転写され、そして前記被覆材の面速度 V_1 、前記被覆材の面速度 V_2 が、 7.5 mm/秒 未満 $V_1 < V_2$ の関係にある画像形成装置において、

$$) \times (R-100)' + 0.16$$

